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Corner (Gard. Bull. S. S. 10: 269–270. 1939) in his discussion of whether this species is native in Malaya cast some doubt on the statement of Brown (Bishop Mus. Bull. 130: 118. 1935) that in the Marquesas this species reaches a height of 10 meters. He describes it as "a smallish and slow-growing tree." I know nothing about the rate of growth and have not actually measured any trees. No one, however, who has seen the trees of this species in some of the deep valleys of Tahiti (Aparé Maué, Papenoo, etc.) could possibly describe the tree as smallish. It has huge buttressed trunks, many feet in diameter, that compare favorably with the giant ceiba trees shown in tropical pictures, and the trees are certainly well in excess of 10 meters tall.

BOTANY.—New Acanthaceae from Guatemala.¹ E. C. LEONARD, U. S. National Museum. (Communicated by WILLIAM R. MAXON.)

During the 1938–39 Sewell Avery Expedition of the Field Museum of Natural History to Guatemala, Paul C. Standley collected a considerable number of Acanthaceae. In the present paper, based on a study of these specimens, six new species are described, one is transferred from *Eranthemum* to *Pseuderanthemum*, and one is renamed.

Ruellia brittoniana Leonard, nom. nov. Fig. 1

Cryphiacanthus angustifolius Nees in DC. Prodr. 11: 199. 1847. Not R. angustifolia Sw., 1788.

Ruellia spectabilis Britton, Ann. New York Acad. 7: 192. 1893; not Nichols, 1886.

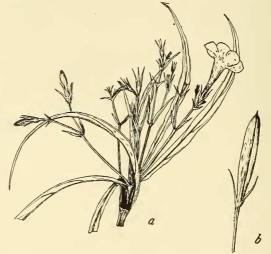


Fig. 1.—Ruellia brittoniana Leonard: a, Portion of plant, half natural size; b, capsule, natural size.

Cultivated near Quiriguá, Department Izabal, Guatemala, altitude 70 to 150 meters, April 26–27, 1939, *Standley* 72225.

¹ Received November 8, 1940.

Ruellia donnell-smithii Leonard, sp. nov.

Fig. 2

Herbae, caulibus quadrangularibus superne cano-pilosulis, infra glabratis; lamina foliorum ovata vel oblongo-ovata, obtusa, basi angustata in petiolum decurrens, integra vel leviter undulata, cano-pilosula, subtus glandulis rotundatis vestita; flores subsessiles axillares solitarii subterminales; calycis segmenta glanduloso-pilosula, lineari-lanceolata; corolla purpurella, parce

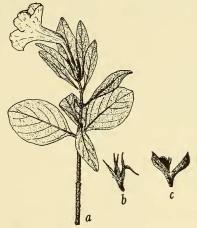


Fig. 2.—Ruellia donnell-smithii Leonard: a, Portion of plant; b, calyx; c, capsule. (a, half natural size; b, c, natural size.)

puberula; capsula puberula glandulis rotundatis vestita; semina nigra, plana, suborbicularia, madefacta dense mucoso-pubescentia.

Erect or decumbent herbs up to 30 cm high or more; stems simple or branched, quadrangular, the tips densely gray-pilosulous, the lower portions often glabrate; leaf blades ovate to oblong-ovate, 2 to 5 cm long, 1 to 2.2 cm wide, obtuse, narrowed at base and decurrent on the petiole, entire or shallowly undulate, grayish-pilosulous, or the older leaves subglabrous, the under surface with scattered roundish glands; petioles 2 to 4 mm long; flowers axillary, solitary, subsessile, borne at or near the tip of the stems; calyx glandular-pilosulous with spreading hairs without, strigose within, the tube 2 mm long, the segments linear-lanceolate, 10 to 12 mm long, 1.25 mm wide at base, gradually narrowed from above the base to a slender blunt tip; corolla 3 to 4 cm long, light purple, sparingly puberulent, the lower half of the tube slender, about 1.5 mm in diameter, the upper portion obconic, about 1 cm broad at the mouth, the limb spreading, 2.5 to 3 cm broad, the lobes suborbicular, 10 to 12 mm wide, rounded; filaments glabrous, one of each pair 2 mm long, the other 7 mm long; ovary puberulent; style 2 cm long, puberulent; capsule 10 to 12 mm long, 4 mm broad toward tip, narrowed to a solid stipitate base 3 mm long and 2 mm broad, puberulent, with small round glands; seeds flat, black, suborbicular, 4 mm in diameter, mucilaginouspubescent when moistened.

Type in the U. S. National Herbarium, no. 944013, collected at San Luís, Department Escuintla, Guatemala, March, 1890, by John Donnell Smith (no. 2015).

Additional specimens examined:

MEXICO: Mount Ovando, Chiapas, March 30, 1935, Matuda 123.

GUATEMALA: Below Las Lajas, Department Escuintla, altitude 900 to 1,200 meters, in a dry thicket, February 9, 1939, *Standley* 64807.

Close to *R. geminiflora* H.B.K. but readily distinguished by its densely glandular-pilosulous calyx.

Ruellia standleyi Leonard, sp. nov.

Fig. 3

Herbae viscidae, caulibus subquadrangularibus, glanduloso-pilosis; lamina foliorum ovata vel elliptica, pilosula, apice breviter acuminata, basi rotundata



Fig. 3—Ruellia standleyi Leonard: a, Tip of panicle; b, leaf; c, calyx; d, ovary and style; e, portion of panicle from fruiting plant. (a, natural size; b, half natural size; c, d, e, natural size.)

vel truncata; petioli glanduloso-pilosi; panicula terminalis, glanduloso-pilosa; calycis segmenta lineari-subulata, glanduloso-pilosa; corolla anguste campanulata, lobis parvis; capsula oblonga, glabra vel apice parce pubescens; semina plana, brunnea, madefacta mucoso-pilosa.

A viscid herb up to 1.3 meters high; stems subquadrangular, glandularpilose or the lower portions glabrate; leaf blades ovate to elliptic, up to 15 cm long and 10 cm wide, short-acuminate, narrowed, rounded or truncate at the base, pilosulous, the pubescence denser beneath than above, the costa and lateral veins (5 to 8 pairs) rather prominent; petioles up to 9 cm long, glandular-pilose; inflorescence a terminal, much branched, glandular-pilose panicle, the flowers rather numerous, subsessile, axillary or borne in the forks of the branches of the panicle; bracts lanceolate to subulate, small, or the lowermost larger and leaflike; calyx 15 mm long at maturity, the segments linear-subulate, rounded at tip, glandular-pilose, the hairs spreading, rather scattered, up to 1.5 mm long; corolla up to 18 mm long, finely pubescent, narrowly campanulate, the lobes about 3 mm long; stamens glabrous, the filaments of the longer pair about 4 mm long, those of the shorter pair about 2 mm long, the anthers about 2.5 mm long; style about as long as the corolla; capsules oblong, 15 mm long, 3.5 mm broad, glabrous or bearing a few minute hairs toward the tip, 8- to 10-seeded; seeds brown, flat, 2.5 mm long, a little more than 2 mm broad, finely gelatinous-pilose when moistened. Type in the herbarium of the Field Museum of Natural History, no.

Type in the herbarium of the Field Museum of Natural History, no. 992848, collected on Finca Pireneos, below Santa María de Jesús, Department Quezaltenango, Guatemala, altitude 1,350 to 1,380 meters, in a damp forest, March 11, 1939, by Paul C. Standley (no. 68390).

Additional specimens examined:

DEPT. QUEZALTENANGO: Damp forest near El Muro, below Santa María de Jesús, altitude about 1,200 meters, *Standley* 67150.

DEPT. SUCHITEPÉQUEZ: Wet thicket near Pueblo Nuevo, altitude about 750 meters, *Standley* 66970.

DEPT. SAN MARCOS: Wet thicket along Río Ixpal, below Rodeo, altitude about 750 meters, *Standley* 68720.

This is closely related to *Ruellia paniculata* L., but it can be distinguished easily by its large, nearly naked terminal inflorescence and larger capsules, in *Ruellia paniculata* the inflorescence being axillary and leafy and the capsules narrowly cylindric and not over 9 mm long. It resembles more closely *R. ochroleuca* Mart., but in that species the inflorescence is not glandular. From herbarium material it is impossible to determine the color of the corolla.

Pseuderanthemum praecox (Benth.) Leonard, comb. nov.

Eranthemum praecox Benth. Pl. Hartw. 291. 1848.

Siphoneranthemum praecox Kuntze, Rev. Gen. Pl. 497. 1891.

Dry oak and pine forest near San Martín Jilotepeque, Department Chimaltenango, Guatemala, altitude about 1,800 meters, February 3, 1939, *Standley* 64391. Dry rocky hills north of Santa Rosa, Department Baja Verapaz, Guatemala, March 30, 1939, *Standley* 69829.

Dicliptera debilis Leonard, sp. nov.

Fig. 4

Herba debilis, caulibus parce pilosis; lamina foliorum ovata vel lanceolata, acuminata, basi angustata, in petiolum decurrens; cymae axillares, subsessiles, bracteis triangulari-ovatis, cuspidatis, coriaceis, carinatis, ciliatis, carina strigosa; bracteae floriferae oblanceolatae, obtusae vel rotundatae, apiculatae; bracteolae lanceolatae, puberulae; calycis segmenta subulata; corolla subrufa, minute pubescens; capsulae parce glanduloso-puberulae.

Weak herb; stems up to 3.3 meters long, sparingly pilose, the hairs retrorsely curved; leaf blades ovate to lanceolate, acuminate (the tip blunt), narrowed at base and decurrent on the petiole, sparingly pilose except the

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costa, this densely hirtellous; petioles slender, up to 1.5 cm long, hirtellous, the hairs curved; flowers borne in subsessile, axillary, 3-parted cymes; bracts subtending the cyme triangular-ovate, 3 to 3.5 mm long, 1.5 to 2 mm wide, cuspidate, coriaceous, carinate, ciliate, the keel strigose; bracts subtending the flowers oblanceolate, obtuse or rounded, apiculate, pilosulous without, puberulent within (some of the hairs glandular), the larger of the middle pair about 1.5 cm long and 7 mm wide, the larger of the lateral pairs 12 mm long and 6 mm wide, the smaller bracts of each pair 8 mm long and 3.5 mm wide;

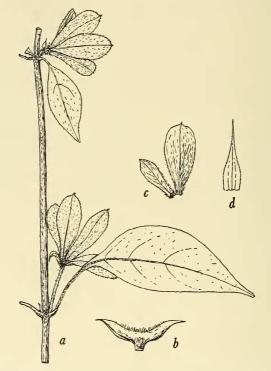


Fig. 4.—*Dicliptera debilis* Leonard: *a*, Portion of plant; *b*, bracts subtending the cyme; *c*, bracts subtending the flowers (inner surfaces); *d*, calyx segment. (*a*, natural size; *b*, twice natural size; *c*, natural size; *d*, twice natural size.)

bractlets lanceolate, the larger pair 6 mm long, slightly over 1 mm wide, the smaller pair 5 mm long and slightly less than 1 mm wide, all puberulent; calyx 8 mm long, puberulent, the segments subulate, 6 mm long, 1 mm wide at the base; corolla 2.5 to 3 cm long, pale red, minutely pubescent, the tube slender; capsules (immature) 1 cm long, sparingly glandular-puberulent.

slender; capsules (immature) 1 cm long, sparingly glandular-puberulent. Type in the herbarium of the Field Museum of Natural History, no. 992431, collected north of Santa Rosa, Department Baja Verapaz, Guatemala, in pine-oak forest on a dry rocky hill, March 30, 1939, by Paul C. Standley (no. 69823).

Apparently unrelated to any other Central American member of the genus. The lower leaves, early deciduous and absent in the type specimen, are probably larger than the uppermost, from which the measurements are taken.

Dicliptera inutilis Leonard, sp. nov.

Fig. 5

Suffrutex, caulibus parce et minute pubescentibus, deorsum glabris; lamina foliorum ovata, acuminata, basi angustata, hirtella; cymae axillares et terminales breviter pedunculatae, 3-partitae; bracteae floriferae oblongoovatae, subobtusae, basi truncatae, virides, venosae, parce pubescentes;

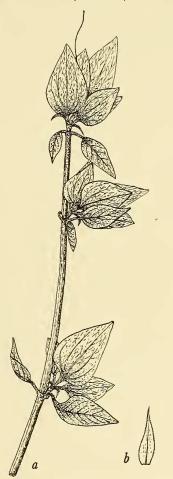


Fig. 5.—*Dicliptera inutilis* Leonard: *a*, Portion of plant, natural size; *b*, bractlet, twice natural size.

bracteolae lanceolatae; calycis segmenta lanceolata, minute pubescentia; corolla purpurea, parce pubescens.

Shrubby herb up to 1.3 meters high; stems much branched, sparingly and minutely pubescent, or the lower parts glabrate; leaf blades (uppermost) ovate, up to 4 cm long and 3 cm wide, acuminate (the tip blunt), narrowed at base, hirtellous, the hairs confined chiefly to the costa and veins; petioles up to 1 cm long, hirtellous; flowers borne in axillary and terminal shortpeduncled 3-parted cymes, the peduncle 1 to 3 cm long, subtomentose; bracts subtending the middle cluster of flowers oblong-ovate, up to 2 cm

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long and 1.2 cm wide, subobtuse, truncate at base, green, veiny, sparingly puberulent, the bracts of the lateral clusters similar but smaller; bractlets lanceolate, up to 6 mm long and 1.5 mm wide, minutely pubescent beneath, glabrous above; calyx segments lanceolate, about 5 mm long and slightly more than 1 mm wide, minutely pubescent; corolla 2 to 2.5 mm long, rosepurple, sparingly pubescent; capsule not seen.

Type in the herbarium of the Field Museum of Natural History, no. 993732, collected at Los Llanitos, near San José Acatempa, Department Jutiapa, Guatemala, altitude about 1,200 meters, in a moist thicket, December 21, 1938, by Paul C. Standley (no. 60579).

Distinct from other Central American species of *Dicliptera* in its subsessile 3-parted cymes and its rather large, oblong-ovate, green, veiny bracts. The lower leaves, early deciduous and therefore lacking in the type material, probably exceed the dimensions here given for the uppermost leaves.

Dicliptera membranacea Leonard, sp. nov.

Fig. 6

Herba, caulibus ramosis, glabris vel ad nodos parce et minute pubescentibus; lamina foliorum ovata vel oblongo-ovata, subobtusa, acuta vel breviter acuminata, basi angustata, in petiolum decurrens, glabra vel subtus parce pubescens; petioli graciles; cymae sessiles vel subsessiles, flabelliformes, axillares vel terminales, bracteis ovatis, viridibus, venosis, subtus minute pubescentibus, basi cuneatis, marginibus angustis albis; bracteae floriferae inaequales oblanceolatae, parce pilosulae, ciliatae, apice rotundatae apiculataeque vel acutae, virides, margine basi alba; bracteolae lineares, albidae, acuminatae, ciliatae; calycis segmenta subulata, puberula, subhyalina; corolla pubescens, purpurella, tubo gracili; ovarium pubescens.

Branching herbs up to 1.3 meters high; stems glabrous or sparingly and minutely pubescent at nodes; leaf blades ovate to oblong-ovate, up to 10 cm long and 6 cm wide, subobtuse to acute or abruptly acuminate (the tip blunt), narrowed at base and decurrent on the petiole, thin, drying bright green, glabrous or with a few minute hairs beneath; petioles slender, up to 4 cm long, glabrous or sparingly pubescent; flowers borne in sessile or subsessile axillary and terminal fanlike cymes, usually of 4 flowers each; bracts subtending the cymes ovate, up to 12 mm long and 6 mm wide, green, veiny, leaflike, sparingly and minutely public public beneath, glabrous above, the cuneate basal portion with a narrow white margin; bracts subtending the flowers unequal, oblanceolate, green with a narrow white border at the base, sparingly pilosulous, ciliate, the larger pair subtending the middle flower cluster 12 mm long and 6 mm wide, rounded at apex and minutely apiculate, the smaller bracts 10 mm long and 3 mm wide, rounded and apiculate, the bracts subtending the lateral flower clusters successively smaller and more acute; bractlets subtending the flowers linear, the larger pair 11 mm long and 1.5 mm wide, the smaller pair 9 mm long and 1 mm wide, all acuminate, whitish, 1-nerved, ciliate, the costa hirtellous; calyx segments subulate, 6 mm long, 0.5 mm wide, subhyaline, ciliate, 3-nerved, puberulent; corolla 13 mm long, pubescent, pale purple, the tube slender; ovary pubescent; capsule not seen.

Type in the U. S. National Herbarium, no. 1780239, collected between Río Jute and Río Pantaleón, on the road between Escuintla and Santa Lucía Cotz, Department Escuintla, Guatemala, in a thicket, altitude 540 to 720 meters, January 24, 1939, by Paul C. Standley (no. 63524); duplicate in the herbarium of the Field Museum of Natural History. No. 63515 of Mr. Standley's collection, from the same locality, is this species also.

Dicliptera membranacea apparently has no close relatives in Central America. The specific name alludes to its thin, green leaf blades.



Fig. 6.—Dicliptera membranacea Leonard: a, Portion of plant, natural size; b, one of the bracts subtending the cyme; c, bracts subtending the middle flower cluster of a cyme; d, bractlets; e, calyx segment. (b, c, d, e, twice natural size.)

Streblacanthus parviflorus Leonard, sp. nov.

Fig. 7

Suffrutex, caulibus teretibus, bifariam pubescentibus; lamina foliorum elliptica vel late lanceolata, acuminata, basi rotundata, membranacea, integra, glabra, costa et venis minute pubescentibus exceptis; petioli graciles; spicae terminales et axillares; bracteae bracteolaeque filiformi-subulatae, minute pubescentes; calycis segmenta filiformi-subulata, minute pubescentia; corolla alba, minute pubescens, labio superiore oblongo-ovato, emarginato, inferiore trilobo, lobis ovatis, subobtusis; capsulae complanatae, stipitatae, minute et parce pubescentes; semina pallide brunnea, papillosa.

Suffrutescent herb up to 60 cm high; stems terete, pubescent in two lines;

leaf blades elliptic to broadly lanceolate, up to 6 cm long and 3.5 cm wide, acuminate (the tip blunt), rounded at base, thin, entire, glabrous except upon the costa and lateral veins, these minutely and inconspicuously pubescent with curved hairs; petioles slender, up to 4 cm long, glabrous or the grooves pubescent; flowers borne in terminal and axillary spikes up to 5 cm long; bracts, bractlets, and calyx segments filiform-subulate, about 1.5 cm



Fig. 7.—Streblacanthus parviflorus Leonard: a, Portion of plant, natural size; b, bract; c, calyx segment; d, pistil. (b, c, d, twice natural size.)

long, the bracts 1.5 mm wide at the base, the bractlets 0.5 mm wide, the calyx segments 1 mm wide, all 3-nerved, sparingly and minutely pubescent; corolla white, 17 mm long, minutely pubescent, the tube slender from base to middle, about 1 mm in diameter, the upper half obconic, 3.5 mm in diameter at mouth, the limb slightly 2-lipped, the upper lip oblong-ovate, 3 mm wide at base, emarginate, the lower lip 3-lobed, the lobes ovate, 4 mm long and 2.5 mm wide, subobtuse; anthers 2 mm long, 1 mm wide; style 6 mm long, glabrous; capsule 12 mm long, flattened, stipitate, 4 mm wide, 4-seeded, minutely and inconspicuously pubescent, the hairs spreading; seeds flat, light brown, 4 mm in diameter, minutely alveolate, roughened by short papillae.

Type in the herbarium of the Field Museum of Natural History, no. 990984, collected at Escoba, across the bay (west) from Puerto Barrios, Department Izabal, Guatemala, in a wet forest near sea level, May 3, 1939, by Paul C. Standley (no. 72949). Duplicate in U. S. National Herbarium, no. 1780245.

Streblacanthus parviflorus is related to S. cordatus, a species apparently limited to Panamá. The calyx, bracts, and bractlets are similar in both species, but in S. cordatus the flowers are much longer and larger and the leaves are strongly cordate.

ORNITHOLOGY.—Remarks on the Kentish plovers of the Extreme Orient, with separation of a new subspecies.¹ H. G. DEIGNAN, U. S. National Museum. (Communicated by HERBERT FRIEDMANN.)

In ascertaining which forms of the Kentish plover (*Charadrius alexandrinus*) occur in winter in the Indo-Chinese countries, I have found it necessary to review the extensive material of this species from eastern Asia in the U. S. National Museum and have arrived at conclusions rather at variance from those of the most recent revisers.

Their treatment has recognized two races in the Far East: (1) dealbatus of Swinhoe, a long-billed bird, described from South China (type specimen from Amoy, not Hainan) and believed to breed in Japan, the Ryu Kyu Islands, in Formosa, Hainan, and on the Chinese coasts from Fukien to Chihli, and to winter in the Indo-Chinese countries and Malaysia; (2) alexandrinus of Linnaeus, a short-billed bird, described from Egypt and believed to breed from England across northern Asia to Korea, and to winter in Africa and all tropical Asia.

A good series of birds from Amoy (June, July) are decidedly paler than birds from Europe, have a longer and more massive bill, and in every case have the upperparts suffused with rufous. Swinhoe's de scription of *dealbatus* as a "washed-out," rufescent-tinged *alexan drinus* fits these specimens perfectly. Another series of badly worn birds from Chihli (July) are probably *dealbatus*. In addition, I have seen examples of this race from Hongkong (October, November) and Hainan (March).

Two birds from Thailand (November, March) and two from Malaya (December), all in winter dress, are so remarkably pale above that they stand out from all other Old World specimens I have seen and can fairly be compared only with *nivosus* and *tenuirostris* of North America. However, the wing length and size of bill are like

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